

# VU Research Portal

## Glycoproteomics and Glycomics: Method Development and Clinical Applications

Stavenhagen, K.

2017

### **document version**

Publisher's PDF, also known as Version of record

[Link to publication in VU Research Portal](#)

### **citation for published version (APA)**

Stavenhagen, K. (2017). *Glycoproteomics and Glycomics: Method Development and Clinical Applications*. [PhD-Thesis - Research and graduation internal, Vrije Universiteit Amsterdam].

### **General rights**

Copyright and moral rights for the publications made accessible in the public portal are retained by the authors and/or other copyright owners and it is a condition of accessing publications that users recognise and abide by the legal requirements associated with these rights.

- Users may download and print one copy of any publication from the public portal for the purpose of private study or research.
- You may not further distribute the material or use it for any profit-making activity or commercial gain
- You may freely distribute the URL identifying the publication in the public portal ?

### **Take down policy**

If you believe that this document breaches copyright please contact us providing details, and we will remove access to the work immediately and investigate your claim.

### **E-mail address:**

[vuresearchportal.ub@vu.nl](mailto:vuresearchportal.ub@vu.nl)

# Table of Contents

## 1

*Introduction*

## 2

*Clinical glycomics employing graphitized carbon liquid chromatography–mass spectrometry*

## 3

*Quantitative mapping of glycoprotein microheterogeneity and macroheterogeneity: An evaluation of mass spectrometry signal strengths using synthetic peptides and glycopeptides*

## 4

*The art of destruction: Optimizing collision energies in quadrupole-time of flight (QTOF) instruments for glycopeptide-based glycoproteomics*

## 5

*Site-specific protein N- and O-glycosylation analysis by a C18- porous graphitized carbon–liquid chromatography–electrospray ionization mass spectrometry approach using Pronase-treated glycopeptides*

## 6

*Multi-methodological mass spectrometric N- and O-glycosylation analysis of human C1-inhibitor reveals extensive mucin-type O-glycosylation*

## 7

*Towards a comprehensive, site-specific N- and O-glycosylation analysis of antibody-based therapeutics*

## 8

*Mapping of the human bowel N-glycome reveals region-specific glycosylation features*

## 9

*General discussion and summary  
Curriculum vitae  
List of Publications*